

# Employee Post-Travel Disclosure of Travel Expenses

Date/Time Stamp:

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2018 DEC -3 PM 4:39

**Post-Travel Filing Instructions:** Complete this form within **30 days** of returning from travel. Submit all forms to the **Office of Public Records in 232 Hart Building**.

In compliance with Rule 35.2(a) and (c), I make the following disclosures with respect to travel expenses that have been or will be reimbursed/paid for me. I also certify that I have attached:

- ☒ The **original** *Employee Pre-Travel Authorization* (Form RE-1), **AND**  
☒ A **copy** of the *Private Sponsor Travel Certification Form* with all attachments (itinerary, invitee list, etc.)

Information Technology and Innovation Foundation (ITIF)

Private Sponsor(s) (list all):

Travel date(s): October 29, 2018 - October 31, 2018

Name of accompanying family member (if any): Sunnyvale, California

Relationship to Traveler: ☐ Spouse ☐ Child

IF THE COST OF LODGING **DID NOT INCREASE** DUE TO THE ACCOMPANYING SPOUSE OR DEPENDENT CHILD, ONLY INCLUDE LODGING COSTS IN EMPLOYEE EXPENSES. (Attach additional pages if necessary.)

## Expenses for Employee:

	Transportation Expenses	Lodging Expenses	Meal Expenses	Other Expenses (Amount & Description)
<input type="checkbox"/> Good Faith Estimate	\$689	\$416	\$116	
<input checked="" type="checkbox"/> Actual Amount				

## Expenses for Accompanying Spouse or Dependent Child (if applicable):

	Transportation Expenses	Lodging Expenses	Meal Expenses	Other Expenses (Amount & Description)
<input type="checkbox"/> Good Faith Estimate				
<input type="checkbox"/> Actual Amount				

Provide a description of all meetings and events attended. See Senate Rule 35.2(c)(6). (Attach additional pages if necessary.): Please see attached.

12/3/18  
(Date)

Ariel Marshall  
(Printed name of traveler)

Ariel Marshall  
(Signature of traveler)

TO BE COMPLETED BY SUPERVISING MEMBER/OFFICER:

I have made a determination that the expenses set out above in connections with travel described in the *Employee Pre-Travel Authorization* form, are necessary transportation, lodging, and related expenses as defined in Rule 35.

12/3/18  
(Date)

Jeanne Shaker  
(Signature of Supervising Senator/Officer)

## **ADDENDUM TO EMPLOYEE POST-TRAVEL DISCLOSURE OF TRAVEL EXPENSES (FORM RE-2)**

### **Monday, October 29, 2018**

- PG&E (San Francisco, CA)
  - Pacific Gas and Electric (PG&E) Company is one of the largest combined natural gas and electric energy companies in the United States. Based in San Francisco, the company is comprised of approximately 20,000 employees who carry out the transmission and delivery of energy. PG&E provides natural gas and electric service to approximately 16 million people throughout a 70,000-square-mile service area in northern and central California.
  - During the event, we toured PG&E's Energy Trading Floor, where they manage grid operations. We also discussed various energy challenges facing California and the nation, including integrating solar and wind on to the electric grid.
- Powerhouse (Oakland, CA)
  - Powerhouse is an Oakland based co-working space and seed fund that houses and invests in entrepreneurs building software focused companies that are enabling a world powered by clean energy applications. During the event, we met with several businesses supported by Powerhouse to hear about the technologies they are developing and how it would further the nation's renewable energy goals.
- Lawrence Berkeley National Lab and Cyclotron Road (Berkeley, CA)
  - Lawrence Berkeley Lab is a multiprogram science lab in the national laboratory system supported by the U.S. Department of Energy (DOE) through its Office of Science. In addition to conducting research across a wide range of scientific disciplines, Lawrence Berkeley also houses Cyclotron Road, an entrepreneurial technology fellowship program that supports leading entrepreneurial scientists as they advance technology projects with the potential for global impact.
  - During the event, we toured Lawrence Berkeley Lab and spoke with Cyclotron Road fellows about their research.
- Dinner and Speaker Presentation (Berkeley, CA)
  - During the dinner, we received an in-depth briefing from one of Cyclotron Road's successful fellows.

### **Tuesday, October 30, 2018**

- G2VP (Menlo Park, CA)
  - G2VP is a venture capital firm that invests in emerging technologies, including cloud computing, machine learning, computer vision, mobility and many others, that digitize traditional industries and drive market transformations. During the meeting, we met with senior partners at G2VP to discuss their efforts accelerate new developments in the energy sector.
- Bloom Energy (Sunnyvale, CA)
  - Bloom Energy is a California-based manufacturer that develops, builds and installs state of the art fuel cells. While at Bloom Energy, we took a tour of their facility and learned more about the products they offer that would help address national challenges such as an aging grid infrastructure, natural disasters and rising electricity costs.



- VMWare (Palo Alto, CA)
  - Data centers comprise a rapidly growing share of U.S. energy consumption, and many data companies have made clean energy commitments that will be difficult to meet without energy-efficiency improvements. With VMware server virtualization, a hypervisor is installed on the physical server to allow for multiple virtual machines (VMs) to run on the same physical server. Each VM can run its own operating system (OS), which means multiple OSes can run on one physical server and use less energy.
  - During the event, we learned how VMWare manages demand, implements energy efficiency improvements and fulfills its clean energy commitments, while still providing the ultra-reliable services that the data industry requires.
- Hoover Institution, Stanford University (Palo Alto, CA)
  - The Hoover Institution is a public policy think tank and research institution located at Stanford University promoting the principles of individual, economic and political freedom. During the event, we met with scientists and engineers at Stanford who are conducting research and development projects on carbon capture and storage.
- Roundtable Discussion with Stanford University Energy Club
  - Following the event at the Hoover Institution, we took part in an informal meeting with members of the Stanford Energy Club, where we discussed our work in Washington D.C.
- Dinner Discussion with David Danielson, Breakthrough Energy Ventures
  - Breakthrough Energy Ventures is an investor-led fund committed to investing in companies that provide reliable and affordable power without contributing to climate change.
  - We heard from David Danielson, former program director at ARPA-E and assistant secretary for DOE's Office of Energy Efficiency and Renewable Energy. Danielson is currently with Breakthrough Energy Ventures. During the dinner, provided insights into clean energy technology needs and opportunities, based on his expertise and experiences both at DOE and at Breakthrough Energy Ventures.

### **Wednesday, October 31, 2018**

- Fremont Cleantech Advanced Manufacturing Cluster (Fremont, CA)
  - During the event, we visited two co-located manufacturers, NEXTracker Inc. and Solaria to visit their facilities and learn about their respective solar technologies. NexTracker designs, manufactures and services the advanced single-axis solar trackers for the power plants. Solaria designs advanced solar modules and develops new manufacturing processes for them.

July 27, 2018

Ariel Marshall  
Senior Policy Advisor  
Senator Jeanne Shaheen  
Washington, DC

Dear Ariel:

I write to invite you to join Congressional staff colleagues and ITIF experts on the first ITIF Advanced Energy Technology Education Series Staff Trip to the **San Francisco, California** Bay area on Monday, October 29<sup>th</sup> through Wednesday, October 31<sup>st</sup>, 2018.

Over the past decade, ITIF has hosted Hill staff on educational visits to cutting-edge organizations in a range of science and technology fields. These visits allow participants to meet engineers, scientists investors, and entrepreneurs who are bringing new products to market, changing the way business is done, and pushing forward the frontiers of knowledge.

Prior trips have included hearing first-hand from leading technology executives and futurists about how innovations like advanced wireless and quantum computing may change our world over the next decade. And we have had fascinating dinner conversations with prominent venture capitalists and academic leaders about the key issues affecting the U.S. innovation and entrepreneurial economy.

We expect this trip to be no different — especially since we expect to have about 15 staffers like you joining us. We anticipate a packed schedule, likely to include stops at Lawrence Berkeley National Laboratory/Cyclotron Road, Stanford University, energy start-ups in a diverse range of technology domains, and top tech firms who are leading the transition to the smart grid.

This trip is a great opportunity to engage in rich discussions and dialogue with leading energy innovation companies, research institutions, and thinkers.

Below is a tentative schedule:

<b>Monday, October 29, 2018:</b>	Morning flight from Washington, DC (DCA) to San Francisco, CA (SFO) followed by site visits in San Francisco, Berkeley, and Oakland.
<b>Tuesday, October 30, 2018:</b>	Site visits in the Silicon Valley area.
<b>Wednesday, October 31, 2018:</b>	Site visits in the south Bay area before early afternoon return flight to DCA.

All travel expenses and meals are paid for by ITIF and the trip complies with House, Senate and administration rules governing privately sponsored travel.

ITIF is a non-profit, non-partisan public policy think tank committed to articulating and advancing a pro-productivity, pro-innovation and pro-technology agenda internationally, in Washington and in the states. ITIF focuses exclusively on innovation, productivity, and digital economy issues all in the



context of expanded global integration. ITIF is a 501(c)(3) organization governed by a board of distinguished IT and innovation policy leaders and experts. For more information, visit [www.ITIF.org](http://www.ITIF.org).

In order to ensure timely submission to all relevant ethics committees, please let us know if you can participate in the trip by emailing Kaya Singleton at [ksingleton@itif.org](mailto:ksingleton@itif.org) no later than **Friday, September 7, 2018**.

We hope you can join us.

Sincerely,



Robert D. Atkinson, Ph.D.  
Founder & President, ITIF

Date/Time Stamp:

## EMPLOYEE PRE-TRAVEL AUTHORIZATION

**Pre-Travel Filing Instructions:** Complete and submit this form at least 30 days prior to the travel departure date to the **Select Committee on Ethics in SH-220**. Incomplete and late travel submissions will **not** be considered or approved. This form **must** be typed and is available as a fillable PDF on the Committee's website at [ethics.senate.gov](http://ethics.senate.gov). Retain a copy of your entire pre-travel submission for your required post-travel disclosure.

ETHIC SEP28'18AM11:25

Name of Traveler: Ariel Marshall

Employing Office/Committee: Office of U.S. Senator Jeanne Shaheen

Private Sponsor(s) (list all): Information Technology and Innovation Foundation (ITIF)

Travel date(s): October 29, 2018 - October 31, 2018

*Note: If you plan to extend the trip for any reason you **must** notify the Committee.*

Destination(s): San Francisco, CA

Explain how this trip is specifically connected to the traveler's official or representational duties:

This trip will provide information about policies and best practices that are helping to drive advances in energy efficiency and energy production. As an advisor on energy and environmental issues, this will help inform me of the latest technology and advances in the field.

Name of accompanying family member (if any): None

Relationship to Employee: ☐ Spouse ☐ Child

I certify that the information contained in this form is true, complete and correct to the best of my knowledge:

9/28/18  
(Date)

Ariel Marshall  
(Signature of Employee)

TO BE COMPLETED BY SUPERVISING SENATOR/OFFICER (President of the Senate, Secretary of the Senate, Sergeant at Arms, Secretary for the Majority, Secretary for the Minority, and Chaplain):

I, Senator Jeanne Shaheen hereby authorize Ariel Marshall  
(Print Senator's/Officer's Name) (Print Traveler's Name)

an employee under my direct supervision, to accept payment or reimbursement for necessary transportation, lodging, and related expenses for travel to the event described above. I have determined that this travel is in connection with his or her duties as a Senate employee or an officeholder, and will not create the appearance that he or she is using public office for private gain.

I have also determined that the attendance of the employee's spouse or child is appropriate to assist in the representation of the Senate. (signify "yes" by checking box) ☐

9/28/18  
(Date)

Jeanne Shaheen  
(Signature of Supervising Senator/Officer)



## PRIVATE SPONSOR TRAVEL CERTIFICATION FORM

This form must be completed by any private entity offering to provide travel or reimbursement for travel to Senate Members, officers, or employees (Senate Rule 35, clause 2). Each sponsor of a fact-finding trip must sign the completed form. The trip sponsor(s) must provide a copy of the completed form to each invited Senate traveler, who will then forward it to the Ethics Committee with any other required materials. The trip sponsor(s) should **NOT** submit the form directly to the Ethics Committee. Please consult the accompanying instructions for more detailed definitions and other key information.

The Senate Member, officer, or employee **MUST** also provide a copy of this form, along with the appropriate travel authorization and reimbursement form, to the Office of Public Records (OPR), Room 232 of the Hart Building, within thirty (30) days after the travel is completed.

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1. Sponsor(s) of the trip (please list all sponsors):  
Information Technology and Innovation Foundation
  2. Description of the trip: Educational trip for Congressional staff to gain a well-rounded perspective on the energy innovation process.
  3. Dates of travel: October 29 - October 31, 2018
  4. Place of travel: Sunnyvale, CA
  5. Name and title of Senate invitees: See Attachments
  6. I *certify* that the trip fits one of the following categories:  
☒ (A) The sponsor(s) are not registered lobbyists or agents of a foreign principal **and** do not retain or employ registered lobbyists or agents of a foreign principal **and** no lobbyist or agents of a foreign principal will accompany the Member, officer, or employee *at any point* throughout the trip.  
- OR -  
☐ (B) The sponsor or sponsors are not registered lobbyists or agents of a foreign principal, but retain or employ one or more registered lobbyists or agents of a foreign principal and the trip meets the requirements of Senate Rule 35.2(a)(2)(A)(i) or (ii) (*see question 9*).
  7. ☒ I *certify* that the trip will not be financed in any part by a registered lobbyist or agent of a foreign principal.  
- AND -  
☒ I *certify* that the sponsor or sponsors will not accept funds or in-kind contributions earmarked directly or indirectly for the purpose of financing this specific trip from a registered lobbyist or agent of a foreign principal or from a private entity that retains or employs one or more registered lobbyists or agents of a foreign principal.
  8. I *certify* that:  
☒ The trip will not in any part be planned, organized, requested, or arranged by a registered lobbyist or agent of a foreign principal except for *de minimis* lobbyist involvement.  
- AND -  
☒ The traveler will not be accompanied on the trip by a registered lobbyist or agent of a foreign principal except as provided for by Committee regulations relating to lobbyist accompaniment (*see question 9*).

9. **USE ONLY IF YOU CHECKED QUESTION 6(B)**

I *certify* that if the sponsor or sponsors retain or employ one or more registered lobbyists or agents of a foreign principal, one of the following scenarios applies:

☐ (A) The trip is for attendance or participation in a one-day event (exclusive of travel time and one overnight stay) and no registered lobbyists or agents of a foreign principal will accompany the Member, officer, or employee *on any segment* of the trip.

– OR –

☐ (B) The trip is for attendance or participation in a one-day event (exclusive of travel time and two overnight stays) and no registered lobbyists or agents of a foreign principal will accompany the Member, officer, or employee *on any segment* of the trip (*see questions 6 and 10*).

– OR –

☐ (C) The trip is being sponsored only by an organization or organizations designated under § 501(c)(3) of the Internal Revenue Code of 1986 and no registered lobbyists or agents of a foreign principal will accompany the Member, officer, or employee *at any point* throughout the trip.

10. **USE ONLY IF YOU CHECKED QUESTION 9(B)**

If the trip includes two overnight stays, please explain why the second night is practically required for Senate invitees to participate in the travel:

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11. ☒ An itinerary for the trip is attached to this form. I *certify* that the attached itinerary is a detailed (hour-by-hour), complete, and final itinerary for the trip.

12. Briefly describe the role of each sponsor in organizing and conducting the trip:

ITIF is the sole sponsor and is organizing and conducting all aspects of the trip.

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13. Briefly describe the stated mission of each sponsor and how the purpose of the trip relates to that mission:

See Attachments

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14. Briefly describe each sponsor's prior history of sponsoring congressional trips:

ITIF has sponsored multiple congressional trips each year since 2010, and our most recent trip was to Los Angeles and San Diego, CA this year.

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15. Briefly describe the educational activities performed by each sponsor (other than sponsoring congressional trips):

ITIF serves as a resource for elected officials, their staff, the media and the public by publishing policy reports and op-eds and hosting public and private events, debates and policy forums.

16. Total Expenses for Each Participant:

	Transportation Expenses	Lodging Expenses	Meal Expenses	Other Expenses
<input checked="" type="checkbox"/> Good Faith estimate	\$700 (\$450 for airfare; \$250 for ground transportation)	\$416	\$160	\$0
<input type="checkbox"/> Actual Amounts				

17. State whether a) the trip involves an event that is arranged or organized *without regard* to congressional participation or b) the trip involves an event that is arranged or organized *specifically with regard* to congressional participation:

The trip involves events that are arranged and organized specifically with regard to congressional participation.

18. Reason for selecting the location of the event or trip

The Bay Area of California is a leading center for research and development for clean energy technology and is home to many start-up companies and manufacturing facilities.

19. Name and location of hotel or other lodging facility:

The Wild Palms Hotel, 910 East Fremont Avenue, Sunnyvale, CA

20. Reason(s) for selecting hotel or other lodging facility:

This was the only hotel in the region that could accommodate our group within the per diem restrictions.

21. Describe how the daily expenses for lodging, meals, and other expenses provided to trip participants compares to the maximum per diem rates for official Federal Government travel:

Daily expenses for lodging are less than federal per diem rates for Sunnyvale, CA.

Daily expenses for meals are equal to federal per diem rates for Sunnyvale, CA.

22. Describe the type and class of transportation being provided. Indicate whether coach, business-class or first class transportation will be provided. If first-class fare is being provided, please explain why first-class travel is necessary:

Round trip coach class commercial airfare from Washington, DC to San Francisco, CA and coach class ground transportation via charter bus will be provided.

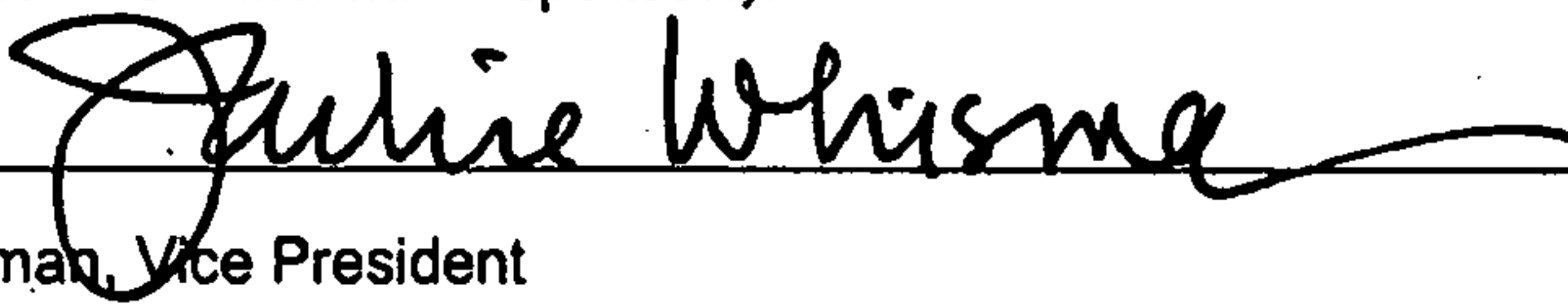
23. ☒ I represent that the travel expenses that will be paid for or reimbursed to Senate invitees do not include expenditures for recreational activities or entertainment (other than entertainment provided to all attendees as an integral part of the event, as permissible under Senate Rule 35).

24. List any entertainment that will be provided to, paid for, or reimbursed to Senate invitees and explain why the entertainment is an integral part of the event:

None

25. I hereby *certify* that the information contained herein is true, complete and correct. (You must include the completed signature block below for each travel sponsor.):

Signature of Travel Sponsor:



Name and Title: Jackie Whisman, Vice President

Name of Organization: ITIF

Address: 1101 K Street, SE, Suite 610, Washington, DC 20005

Telephone Number: (202) 626-5748

Fax Number: None

E-mail Address: jwhisman@itif.org



**PRIVATE SPONSOR TRAVEL CERTIFICATION FORM – SENATE ATTACHMENTS**
**ITIF Staff Education Series Trip to the Bay Area, California – October 29 – 31, 2018**
**Question 5:**

First Name	Last Name	Title	Office/Committee
Radha	Adhar	Legislative Assistant	Senator Tammy Duckworth
Brian	Albert	Legislative Assistant	Rep. Ron DeSantis
Dan	Alpert	Senior Legislative Assistant	Senator Martin Heinrich
Jen	Armstrong	Professional Staff Member	Senate Appropriations, Energy and Water Development Subcommittee
Priscilla	Barbour	Congressional Energy Fellow	Energy and Commerce
Elena	Brennan	Legislative Assistant	Rep. Marsha Blackburn
Becky	Cairns	Senior Policy Advisor	Rep. Niki Tsongas
Chester	Carson	Professional Staff Member	Senate Energy and Natural Resources Committee
Mickeala	Carter	Communications Director	Rep. Filemon Vila
Kristian	Chin	Legislative Assistant	Rep. Zoe Lofgren
Karen	Christian	General Counsel	Energy and Commerce
Doug	Clapp	Professional Staff Member	Senate Appropriations, Energy and Water Development Subcommittee
Seana	Cranston	Deputy Chief of Staff	Rep. Thomas Massie
Joel	Creswell	Legislative Assistant	Rep. Dan Lipinski
Caleb	Crosswhite	Counsel/Prof Staff Member	House Agriculture Committee
Patrick	Cuff	Chief of Staff	Rep. Steve Pearce
Suzanne	Cunningham	Senior Policy Advisor	Senate Energy and Natural Resources Committee
Tanya	Das	Fellow	House Committee on Science, Space and Technology
Jordan	Davis	Senior Advisor	Energy and Commerce
Jed	Dearborn	Energy Counsel	Senator John Barrasso
Jamie	DeAtley	Legislative Assistant	Rep. Anthony Brown
Adam	DeMella	Professional Staff Member	Senate Appropriations, Energy and Water Development Subcommittee
Lane	Dickson	Professional Staff Member	Senate Energy and Natural Resources Committee
Emily	Domenech	Subcommittee Staff Director	House Science, Space and Tech, Energy Subcommittee
Kellie	Donnelly	Deputy Chief Counsel	Senate Energy and Natural Resources Committee
Grant	Dubler	Legislative Director	Rep. Jacky Rosen
Josephine	Eckert	Legislative Assistant	Senator Patty Murray

Chris	Esparza	Counsel	House Natural Resources, Energy and Mineral Resources Subcommittee
Sean	Farrell	Professional Staff Member	Energy and Commerce
Alan	Feyerherm	Deputy Chief of Staff	Rep. Jeff Fortenberry
Adam	Fromm	Coalitions Director	Energy and Commerce
Lindsay	Garcia	Energy Policy Director	Senator Lamar Alexander
Rachel	Gentile	Legislative Director	Rep. Alan Lowenthal
Angie	Giancarlo	Subcommittee Staff Director	House Appropriations, Energy and Water Dev. & Related Agencies
Aaron	Goldner	Energy Policy Advisor	Senator Sheldon Whitehouse
Lindsay	Griffith	Legislative Assistant	Senator Ed Markey
Austin	Hacker	Clerk	House Natural Resources, Energy and Mineral Resources Subcommittee
Heath	Hansen	Legislative Assistant	Senator Mike Lee
Christopher	Hanson	Professional Staff Member	Senate Appropriations, Energy and Water Development Subcommittee
Trevor	Higgins	Legislative Assistant	Senator Dianne Feinstein
Hunter	Hobart	Legislative Assistant	Rep. Gary Palmer
Brian	Hughes	Staff Director	Senate Energy and Natural Resources Committee
Jasmine	Hunt	Senior Policy Advisor	Senator Dick Durbin
Ben	Jackson	Senior Legislative Assistant	Rep. Gene Green
Brennan	Johnson	Legislative Assistant	Senator Richard Shelby
JR	Kane	Correspondence Director	Senator John Barrasso
Andrew	Keyes	Senior Legislative Assistant	Rep. Louie Gohmert
Ben	Kochman	Legislative Director	Rep. Kay Granger
Olivia	Kurtz	Legislative Director	Senator Susan Collins
Brendan	Larkin	Senior Policy Advisor	Rep. Paul Tonko
Rose	Luttenberger	Legislative Assistant	Rep. Frank Pallone
Ariel	Marshall	Senior Policy Advisor	Senator Jeanne Shaheen
Kevin	McAloon	Professional Staff Member	Energy and Commerce
Malcolm	McGeary	Legislative Assistant	Senator Ron Wyden
Megan	Miller	Chief of Staff	Rep. Steve Scalise
Andrew	Mooney	Legislative Director	Rep. Hultgren
Sydney	Pettit	Legislative Assistant	Rep David McKinley
David	Rardin	Legislative Director	Rep. Bill Johnson
Mark	Ratner	Legislative Director	Rep. Fred Upton
Benjamin	Reinke	Professional Staff Member	Senate Energy and Natural Resources Committee
Henry	Ring	Legislative Assistant	Senator Jon Tester
John	Rivard	Legislative Fellow	Senator Lamar Alexander
Tim	Robinson	Chief Counsel	Energy and Commerce
Brent	Robinson	Deputy Chief of Staff	Rep. Rob Wittman



Adam	Rosenberg	Subcommittee Staff Director	House Science, Space and Tech, Energy Subcommittee
Christopher	Santini	Counsel	Energy and Commerce
Nick	Schemmel	Legislative Director	Rep Buddy Carter
Quentin	Scholtz	Legislative Aide	Senator Mitch McConnell
Meyer	Seligman	Professional Staff Member	Senate Appropriations, Energy and Water Development Subcommittee
Leah	Shen	Legislative Assistant	Senator Chris Coons
Dustin	Sherer	Legislative Assistant	Senator Cory Gardner
Josh	Sizemore	Legislative Assistant	Senator Steve Daines
Brian	Skretny	Legislative Director	Rep. Eliot Engel
Alison	Slagell	Legislative Assistant	Rep. Frank Lucas
Jeff	Small	Legislative Director	Rep. Paul Gosar
Michelle	Stoika	Senior Legislative Assistant	Rep. Randy Weber
Aaron	Suntag	Senior Policy Advisor	Senator Debbie Stabenow
Christine	Sur	Legislative Assistant	Rep. Jared Huffman
Katie	Thomas	Policy Advisor	Senator Bernie Sanders
James	Thomas	Legislative Director	Rep. Doug Lamborn
Megan	Thompson	Legislative Assistant	Senator Maria Cantwell
Candace	Vahlsing	Senior Advisor	Senator Michael Bennet
Samantha	Warren	Senior Policy Advisor	Rep Bill Foster
Emily	Wong	Counsel	House Oversight and Government Reform
Thaddeus	Woody	Legislative Aide	Rep. Marc Veasey
Michael	Yancey	Legislative Assistant	Rep. Michael Burgess
Marshall	Yates	Legislative Counsel	Rep. Mo Brooks

**Question 13:**

ITIF is a non-partisan think tank whose mission is to formulate and promote public policies to advance technological innovation and productivity. ITIF focuses on innovation, productivity and digital economy issues. Our interest in the trip is to help staff better understand how new technologies and technology applications are developing and what the trends are likely to be in the future, so that they can better understand and respond to the technological challenges facing our nation.

This trip is part of the "ITIF Education Series" – a set of regular trips with Members of Congress and/or senior House and Senate staff to high-tech and innovation hubs around the country.

**Education Series Staff Trip to the Bay Area, CA  
Monday, October 29 – Wednesday, October 31, 2018**

**Monday, October 29, 2018**

<b>8:30 AM Eastern</b>	<b>United Flight 2042 Departs Washington Reagan (DCA)</b>
<b>11:35 AM Pacific</b>	<b>Flight 2042 Lands San Francisco (SFO)</b>
<b>12:00 PM</b>	<b>Bus Departs SFO + Boxed Lunch</b>
<b>12:30 – 2:00 PM</b>	<b>Pacific Gas &amp; Electric (PG&amp;E) (77 Beale Street, San Francisco)</b>

*Participants will visit the PG&E's Energy Trading Floor, where they manage grid operations, including which generating resources get dispatched. This facility is responsible for managing the renewable generation resources being produced in California and those purchased outside of the state. By doing so, PG&E ensures that it is in compliance with the state's renewable portfolio standard and that its grid operation is consistent with the requirements of the California Independent System Operator.*

<b>2:30 – 4:00 PM</b>	<b>Powerhouse (426 17<sup>th</sup> St., Oakland)</b>
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*Participants will meet with energy start-up companies, including those working on energy-related software solutions, who are resident in Powerhouse's incubator space. The purpose is to understand better the challenges and opportunities that start-ups in this sector face as well as how Powerhouse's collaborative work spaces contribute to their development.*

<b>4:30 – 6:00 PM</b>	<b>Lawrence Berkeley National Lab and Cyclotron Road (1 Cyclotron Road, Berkeley)</b>
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*Participants will receive an overview of LBNL's science and technology activities from lab director Mike Witherell. They will visit LBNL's lab-embedded entrepreneurship program, Cyclotron Road, which allows selected entrepreneurs to draw on the lab's technological facilities and expertise to accelerate their businesses.*

<b>6:00 – 7:00 PM</b>	<b>Dinner and Expert Speaker Presentation (1 Cyclotron Road, Berkeley)</b>
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*The participants will have dinner and hear from Pete Frischmann, CEO of Sepion Technologies. Frischmann was a past Cyclotron Road Fellow and will share how his experience has helped him to create and expand an energy start-up company.*

<b>7:00 – 8:00 PM</b>	<b>Travel to Hotel</b>
<b>RON</b>	<b>The Wild Palms Hotel (910 East Fremont Avenue, Sunnyvale)</b>





**Tuesday, October 30, 2018**

7:00 AM                      **Breakfast Available at Hotel**

8:00 AM                      **Bus Departs Hotel**

8:30 – 10:00 AM           **G2VP (2730 Sand Hill Road, Menlo Park)**

*The participants will meet with David Mount, senior partner at the venture capital firm G2VP, which invests in cleantech start-ups. The discussion will focus on what the private sector can do to accelerate new businesses, how well the venture capital funding model suits the energy sector, and how venture capital financing interacts with other forms of financing across the innovation chain. Discussion may include G2VP's experience building a cleantech portfolio, including how they track emerging technologies and their investment criteria.*

10:30 AM – 12:00 PM      **Bloom Energy (1299 Orleans Drive, Sunnyvale)**

*The participants will gain an understanding of a key emerging technology, fuel cells, which convert chemical energy into electricity. Bloom sells into a diverse array of markets and will provide insight into how different industries are managing their energy mix over time.*

12:15 – 1:00 PM           **Quick Lunch Stop**

1:30 – 3:00 PM             **VMware (3425 Hillview Avenue, Palo Alto)**

*The participants will visit VMware's data center. Data centers comprise a rapidly growing share of U.S. energy consumption, and many data companies, including VMWare, have made clean energy commitments. The participants will learn how the firm manages demand, implements energy efficiency improvements, and fulfills its clean energy commitments, while still providing the ultra-reliable services that the data industry requires.*

3:30 – 5:00 PM             **Hoover Institution, Stanford University (Palo Alto)**

*The participants will meet with scientists and engineers who are conducting research and development projects on carbon capture and storage (CCS). CCS may be a key technology for the transition to a low-carbon energy system, because it will allow continued reliance on fossil fuel resources. However, many challenges remain in implementing it. Participants will gain insights into these challenges and hear about future directions for R&D.*

5:00 – 6:00 PM             **Roundtable Discussion with Stanford University Energy Club**

*The participants will engage informally with student members of the Stanford Energy Club. The students come from a wide variety of disciplines, ranging*

*across science and engineering to business and policy. They will have a chance to learn from the participants about how policy gets made, while sharing their perspectives on the future clean energy landscape.*

6:30 – 8:00 PM

**Dinner Discussion with David Danielson, Breakthrough Energy Ventures**

*The participants will hear from and interact with David Danielson, former program director at ARPA-E and assistant secretary for energy efficiency and renewable energy at DOE. Danielson is currently with Breakthrough Energy Ventures, which was established to provide follow-on private investment funding for projects emerging as a result of Mission Innovation, in which the United States and twenty other leading countries committed to doubling public sector investment in energy research, development, and demonstration (RD&D). Danielson will provide insights into clean energy technology needs and opportunities, based on his expertise and experiences both at DOE and at Breakthrough Energy Ventures. Breakthrough Energy has identified five “Grand Challenges”—in electricity, transportation, agriculture, manufacturing, and buildings—to get to a future powered by clean energy, and has mapped out a landscape of innovation needed to address these challenges.*

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**The Wild Palms Hotel (910 East Fremont Avenue, Sunnyvale)**

**Wednesday, October 31, 2018**

7:00 AM

**Breakfast Available at Hotel**

8:00 AM

**Bus Departs Hotel**

8:30 – 10:30 AM

**Fremont Cleantech Advanced Manufacturing Cluster (6200 Paseo Padre Parkway, Fremont)**

*The participants will visit the City of Fremont, which has an economic development strategy based in part on clean energy manufacturing. They will visit two co-located manufacturers. NexTracker designs, manufactures, and services the advanced single-axis solar trackers for the power plants. Solaria designs advanced solar modules and develops new manufacturing processes for them. These visits will provide insights into the challenges of turning R&D into products that support manufacturing jobs in the United States.*

11:30 AM

**Flight Check In**

1:10 PM Pacific

**United Flight 2046 Departs San Francisco (SFO)**

9:30 PM Eastern

**United Flight 2046 Arrives Washington Reagan (DCA)**

